

CLAIMS

1. Disc brake pad comprising at least one brake lining (120, 220, 320) having at least one plane surface (21, 121, 221, 321) designed to come into friction contact on one face of the disk, the said  
5 surface being referred to as the friction surface in the remainder of the document, characterised in that it is provided with a heat dissipating structure (11, 111, 211 and 231, 330 and 311) which directs the heat flux to be dissipated in at least one direction  
10 substantially parallel to the plane of the said friction surface.

2. Disc brake pad according to claim 1 also comprising one carrier-plate (10, 230 and 231) in which the said heat dissipating structure is formed in the  
15 said carrier-plate.

3. Disc brake pad according to claim 1 or 2 in which the said heat dissipating structure is formed in the lining (120, 220, 320).

4. Disc brake pad according to any one of claims 2  
20 to 3 in which the said heat dissipating structure is formed at the interface between the said lining (120, 220, 320) and the said carrier-plate (110, 210, 310).

5. Disc brake pad according to any one of claims 1  
to 4, in which the said heat dissipating structure is  
25 designed such that it increases the cooling flux either by increasing the exchange surface area between the pad and the surrounding air, or by increasing the thermal conductivity in at least one direction substantially parallel to the friction surface.

6. Disc brake pad according to any one of claims 1 to 5, in which said heat dissipating structure comprises holes (11, 111, 211, 311) in the lining and / or the carrier-plate, with axes along directions substantially parallel to the plane of the friction surface (21, 121, 221, 321), these holes being through holes, such that air can pass freely through them.

7. Disc brake pad according to claim 6 in which the said heat dissipating structure comprises holes (11, 111, 211, 311) in the lining and / or the carrier-plate, with axes parallel to one direction which corresponds to the direction of the moving air at the said pad.

8. Disc brake pad according to any one of claims 1 to 7 in which the said heat dissipating structure comprises projections (230) around the periphery of the carrier-plate (210), the said projections being preferably provided with cooling fins (231).

9. Disc brake pad according to any one of claims 1 to 8, in which the said heat dissipating structure comprises bars (330) in the lining (320) and / or the carrier-plate or also at the lining (320) / carrier-plate (310) interface, made of a material conducting heat better than the material from which the part(s) that contain(s) these bars is made.

10. Disc brake pad according to claim 9 in which the said bars (330) are hollow and form through holes (311) such that air can pass freely through them.

11. Disc brake pad according to claim 9 or 10 in which the length of the said bars (330) is greater than

the length of housings formed in the pad to contain them.

12. Disc brake pad according to claim 11 in which the said bars (330) are provided with a projection  
5 which provides an improved exchange surface area, typically cooling fins.

13. Disc brake pad according to any one of claims 1 to 12 also comprising a piece of sheet metal acting as a heat shield protecting the brake cylinder, the  
10 braking fluid and the piston, the said piece of sheet metal being typically inserted between the carrier-plate and the piston, between the lining and the carrier-plate or between the carrier-plate and a piece of sheet metal fixed to the carrier-plate and designed  
15 to come into contact with the piston.